

What is claimed is:

1. A system for delivering a filter, comprising;
a catheter including an elongate shaft;
the elongate shaft having a proximal end, a distal end, and a wall defining a shaft lumen;
a tubular member having a first end fixed to the wall of the elongate shaft, and a second end disposed within the shaft lumen;
the tubular member defining a guidewire lumen; and
the guidewire lumen being in communication with a distal guidewire port defined by the distal end of the tubular member.
2. The system of claim 1, further including a proximal guidewire port extending through the wall of the elongate shaft.
3. The system of claim 2, wherein the distal guidewire port is disposed proximally of the distal end of the elongate shaft, and the proximal guidewire port is disposed proximally of the distal guidewire port.
4. The system of claim 3, wherein the proximal guidewire port and the distal guidewire port are separated by a longitudinal distance.
5. The system of claim 4, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 55 centimeters.

6. The system of claim 4, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 45 centimeters.

7. The system of claim 4, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 35 centimeters.

8. The system of claim 1, further including a filter disposed within a distal portion of the shaft lumen.

9. The system of claim 1, further including a filter disposed within a distal portion of the shaft lumen and a guidewire extending from the filter through the guidewire lumen.

10. A system for delivering a filter, comprising;
a catheter including an elongate shaft;
the elongate shaft having a proximal end, a distal end, and a wall defining a shaft lumen;

a tubular member having a first end fixed to a wall of the elongate shaft, and a second end disposed within the shaft lumen;

the tubular member defining a guidewire lumen;

the guidewire lumen being in communication with a distal guidewire port defined by the distal end of the tubular member;

a hub disposed about the elongate shaft proximate the distal end thereof;
a slider disposed within a cavity defined by the hub; and
the slider including a means for fixing a guidewire.

11. The system of claim 10, further including a proximal guidewire port extending through the wall of the elongate shaft.

12. The system of claim 11, wherein the distal guidewire port is disposed proximally of the distal end of the elongate shaft, and the proximal guidewire port is disposed proximally of the distal guidewire port.

13. The system of claim 12, wherein the proximal guidewire port and the distal guidewire port are separated by a longitudinal distance.

14. The system of claim 13, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 55 centimeters.

15. The system of claim 13, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 45 centimeters.

16. The system of claim 13, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 35 centimeters.

17. The system of claim 10, further including a filter disposed within a distal portion of the shaft lumen.

18. The system of claim 10, further including a filter disposed within a distal portion of the shaft lumen and a guidewire extending from the filter through the guidewire lumen.

19. The system of claim 10, further including a filter disposed within a distal portion of the shaft lumen and a guidewire extending from the filter through the guidewire lumen, wherein the guidewire is locked to the slider by the locking means.

20. A system for delivering a filter, comprising:

- a catheter including an elongate shaft defining a shaft lumen;
- a elongate shaft having a proximal portion, a distal portion, and a longitudinally collapsible portion disposed between the proximal portion and the distal portion;
- a collapsing means for selectively collapsing the collapsible portion of the elongate shaft;
- a tubular member having a first end fixed to a wall of the proximal portion of the elongate shaft, and a second end disposed within the shaft lumen;
- the tubular member defining a guidewire lumen; and
- the guidewire lumen being in communication with a distal guidewire port defined by the distal end of the tubular member.

21. The system of claim 20, further including a proximal guidewire port extending through the wall of the elongate shaft.

22. The system of claim 21, wherein the distal guidewire port is disposed proximally of the distal end of the elongate shaft, and the proximal guidewire port is disposed proximally of the distal guidewire port.

23. The system of claim 22, wherein the proximal guidewire port and the distal guidewire port are separated by a longitudinal distance.

24. The system of claim 23, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 55 centimeters.

25. The system of claim 23, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 45 centimeters.

26. The system of claim 23, wherein a longitudinal distance between the proximal guidewire port and the distal guidewire port is less than about 35 centimeters.

27. The system of claim 20, further including a filter disposed within a distal portion of the shaft lumen.

28. The system of claim 20, further including a filter disposed within a distal portion of the shaft lumen and a guidewire extending from the filter through the guidewire lumen.

29. The system of claim 20, wherein the tubular member is resistant to collapse.

30. The system of claim 20, wherein the tubular member is resistant to longitudinal collapse.

31. The system of claim 20, wherein the tubular member defines a plurality of apertures in communication with the guidewire lumen and the shaft lumen.